

Solve for the indicated variable.

$$\left(F = \frac{mv^2}{r}\right)^r \text{ for } m$$

$$\frac{F \cdot r}{v^2} = m$$

Aug 30-12:32 PM

Solve for l.

$$A = lwh + lw^2$$

$$A = l(wh + w^2)$$

$$\frac{A}{wh + w^2} = l$$

*
Factor out
the l

Aug 30-12:32 PM

$$\left(S = \frac{rl - a}{r - 1}\right)^{(r-1)} \text{ for } r$$

$$S(r-1) = rl - a$$

$$\frac{Sr - S}{-Sr} = \frac{rl - a}{-Sr}$$

$$\frac{-S}{+a} = \frac{rl - Sr - a}{+a}$$

$$a - S = rl - Sr$$

$$a - S = r(l - S)$$

$$\frac{a - S}{l - S} = r$$

Aug 30-12:32 PM

Notation

(Used when solving
inequalities &)

set-builder notation

$$\{x | x > 19\}$$

$$x > 19$$

"set of all numbers x, such that x > 19"

interval notation

$$(19, +\infty)$$

(open) $\pm \infty$ always open
[closed]

Aug 30-12:33 PM

$$x \geq 19$$

$$[19, +\infty)$$

Sep 9-12:06 PM

Do: Graph and Notations

1. $12 \geq -3p$

$$\{p | p \geq -4\}$$

$$[-4, +\infty)$$

2. $-x > \frac{x-7}{2}$

$$\{x | x < \frac{7}{3}\}$$

$$(-\infty, \frac{7}{3})$$

3. $x+5 < x-3$
 $5 < -3$
 \emptyset

Aug 30-12:33 PM

1.4 Absolute Value Equations

ex/ $|y+3| = 8$

$$y+3=8 \text{ or } y+3=-8$$

$$y=5 \checkmark \quad y=-11 \checkmark$$

$$\{-11, 5\}$$

Always Check ✓

Sep 9-12:16 PM

ex/ $3 + |6-2x| = 9$

$|6-2x| = 6$

Isolate abs. value

$6-2x=6 \text{ or } 6-2x=-6$

$$\{0, 6\}$$

Sep 9-12:19 PM

ex $\frac{19}{3}$

$$\frac{24}{3} - \frac{5}{3} = 2y - 3$$

$$\frac{-10}{3} - \frac{9}{3}$$

$$8 + y = 2y - 3 \text{ OR } 8 + y = -(2y - 3)$$

$$11 = y$$

$$3y = -5$$

$$y = -\frac{5}{3}$$

{11}

Sep 9-12:23 PM

Name the property that justifies the statement.

1. $(-8 + 8) + 15 = 0 + 15$
2. $5(8 - 6) = 5(8) - 5(6)$
3. $3 + 4 = 4 + 3$
4. $5 + x = 5 + x$
5. If $3 + x = 8$, and $8 = 2x - 2$, then $3 + x = 2x - 2$.
6. $(9 + 5) + 17 = 9 + (5 + 17)$
7. If $2 - x = 4$, then $4 = 2 - x$.
8. $9 \cdot \frac{1}{9} = 1$
9. If $3x + 8x = 55$, then $11x = 55$
10. If $3x + 8 = 32$, then $3x = 24$

Aug 30-12:34 PM

HW

p15 #s 21-24, 28-35

p25 #s 35-40, 61, 62

p31 #s 29, 35, 37, 39, 43

p37 #s 21-27 odd (use interval notation)

$$\frac{2}{3} \cdot \frac{3}{2} = 1$$

Identity $\frac{2}{3} \cdot 1 = \frac{2}{3}$

Sep 3-3:13 PM